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JUNE 1992



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Ø BEAT



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*Al Vrooman NOCMW 1341 Diana Lane 80909	473-1660
*Rosie Calaway WAOMNL 616 North 31st St. 80904	471-9965
Ken Phillips NONKP 4850 Santiago Way 80917	574-6358
Matt Wernock KC4KGS 5175 Pinon Valley Rd. 80919	531-6609
Russ Calaway KB0FNW 616 North 31st St. 80904	471-9965
*Steve Westby WB7VHR 1540 Keith Dr. 80916	570-1070
Ron Deutsch NKOP 4305 Ridgelane Dr. 80918	593-8352

* Denotes first year of a two year term.

ZERO BEAT is published monthly in the interest of the members of the Pikes Peak Radio Amateur Association, Inc., P.O. Box 16521, Colorado Springs, Colorado 80935. For membership and subscription information see last page of this publication. The Pikes Peak Radio Amateur Association meets on the second Wednesday of each month at the Elk's Lodge, 3400 North Nevada Ave. at 7 p.m.

EDITOR: Ron Deutsch NKOP 4305 Ridgelane Drive, Colorado Springs, Colorado 80918 (719) 593-8352.

Deadline for submission of articles or ads is the 21st of each month. Submissions may be sent to the editor or to the club mail box. Permission to reprint articles is granted provided credit is given to both the author and this publication.

ADVERTISING RATES: Full page \$48; half page \$24, quarter page \$12, business card size \$6. These are monthly rates and are billed quarterly. Send your ad requests and payments to: P.O. Box 16521, Colorado Springs, CO 80935.

Prez Sez...

By anyone's standards, our recent Swapfest was a success. We sold all of the vendor tables we intended to, there were over 800 people that paid the \$3.00 admission price, we more than paid for the two grand prizes plus the hourly drawings, we raised enough money on the raffle to give ARES and RACES a financial shot in the arm for needed equipment, and the "bottom-line" is we made over \$1,000.00 after all the bills were paid.

Most importantly, this success was accomplished at a much greater cost to us than any of our past Swapfests. This year we were unable to find a location that was free of charge and like most of the other clubs, we had to charge admission to cover the cost of facilities. The cost of tables went up and for the first time we had to obtain both local and state sales tax licenses which was an expense we had not anticipated.

However, I believe that the purpose for this event was accomplished. We had fun getting together and spending a day to talk about our mutual interest in ham radios and, for a growing number, computers.

There were so many people that made this successful that there is no way I can mention them all but I do want to recognize those that spent many weeks preparing for May 16th.: Matt (KC4KGS) for finding us a facility, laying out the tables, and his attention to hundreds of details. Al (NOCMW) and his wife Frances for taking care of all the table assignments. Rosie (WAOMNL) for keeping track of the money and running the raffle desk. Steve (WB7VHR) for writing letters, talking to vendors and setting up the club trailer for "Kenwood Kids". Luci (NOOUD) for coordinating the food. Ron (NKOP) for the publicity and securing the hourly door prizes. Ken (NONKP) for printing flyers and badges. Al (N2IWZ) assisting in the planning and writing articles. And, Sharon (NONRA) for being available to jump in whenever called.

My sincere appreciation is also extended to all of you that helped set-up and tear-down the facility, run the "talk-in", and control traffic.

Harv WB6YXD

**Amendment to By-Laws
proposed by Al Craig**

March 17, 1992

Article II

Membership and Member Meetings:

Section 2. Meetings

It is proposed to extend the last sentence in the existing text to add the following condition: "providing at least 96 hours notice is given to all members of record". This would cause the last sentence to read: "Additional meetings may be held for such special occasions as the association may desire providing at least 96 hours notice is given to all members of record".

Section 7. Cancellation of membership

It is proposed to title the existing paragraph as, "a. Failure to pay dues" and add the following condition as "b. Unacceptable Behavior".

Any member whose conduct is not true to the spirit of Amateur Radio in that he violates the rules established by the Federal Communications Commission in a knowing and willful manner (whether the FCC is involved in the matter or not) and who makes no obvious effort to change his behavior may have his membership canceled by a majority vote of the Board of Directors. The remaining portion of his membership dues shall be returned to him except where his membership was given him at no-charge.

Article III

Board of Directors

Section 3. Removal from office

It is proposed to amend the reading of the second sentence from, "- - may appoint a member in good standing - -" to "- - and has, in addition, appointed a member - -". The second sentence would then read: "However, a director who cannot attend a board meeting and has notified the President or Vice-President to that effect and has, in addition, appointed a member in good standing to act for him/her in which case the director will not be considered to have resigned even if he/she misses a number of concurrent meetings".

Article III

Board of Directors

Section 8. Limitations on Board Authorized Expenditures

It is proposed to add the following limitation to the power of the board of directors. Section 8 would read as follows:

The Board of Directors shall not be empowered to authorize any single expenditure which exceeds \$500. Such an expenditure will require approval by two thirds of the membership in good standing present at the next regular monthly meeting or at a special meeting held in accordance with the requirements of the Bylaws.

Article XII

Dissolution

It is proposed to add the following Article to the Bylaws.

The Pikes Peak Radio Amateur Association may cease to exist as an organization for a number of reasons, three of which are:

- a. The organization decreases in size to the point where its continued existence is without merit.
- b. An external event such as war may cause the suspension of amateur radio which could activate reason (a).
- c. The PPRAA may be absorbed into another organization.

For the PPRAA to be officially dissolved, for any reason, an affirmative vote by two thirds of the members of record in good standing who can be located shall be required. In cases (a) and (b) all assets of the PPRAA shall be converted to cash, any and all debts shall be satisfied, and the remaining cash balance divided among all members of record in good standing who can be located. In case (c) all assets will be transferred to the new organization.

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HOW TO SEE RANDOM DOT STEREOGRAMS

METHOD ONE

The first method involves an ability which is intuitive with some people. Below THE RANDOM FIELD ARE 2 DOTS, They are called fusion dots. Simply allow your eyes to "space out" and gaze through the image. You may have done the same trick when waking up looking at a pattern on wallpaper, or some time gazing at a chain-link fence. (If this doesn't "make sense", you're probably NOT an individual who has done this intuitively all his or her life). In any event, try to "fuse" the spaced out image of the dots into a clear, central dot. If you get it, just hold on while perceiving the rest of the image in your peripheral vision. If you can, without losing the third dot, glance slowly around the rest of the page. If you hold the "third dot" long enough (and that ability varies from individual to individual from 5 seconds to 5 minutes) your brain will decode the computer-created image in the random dots.

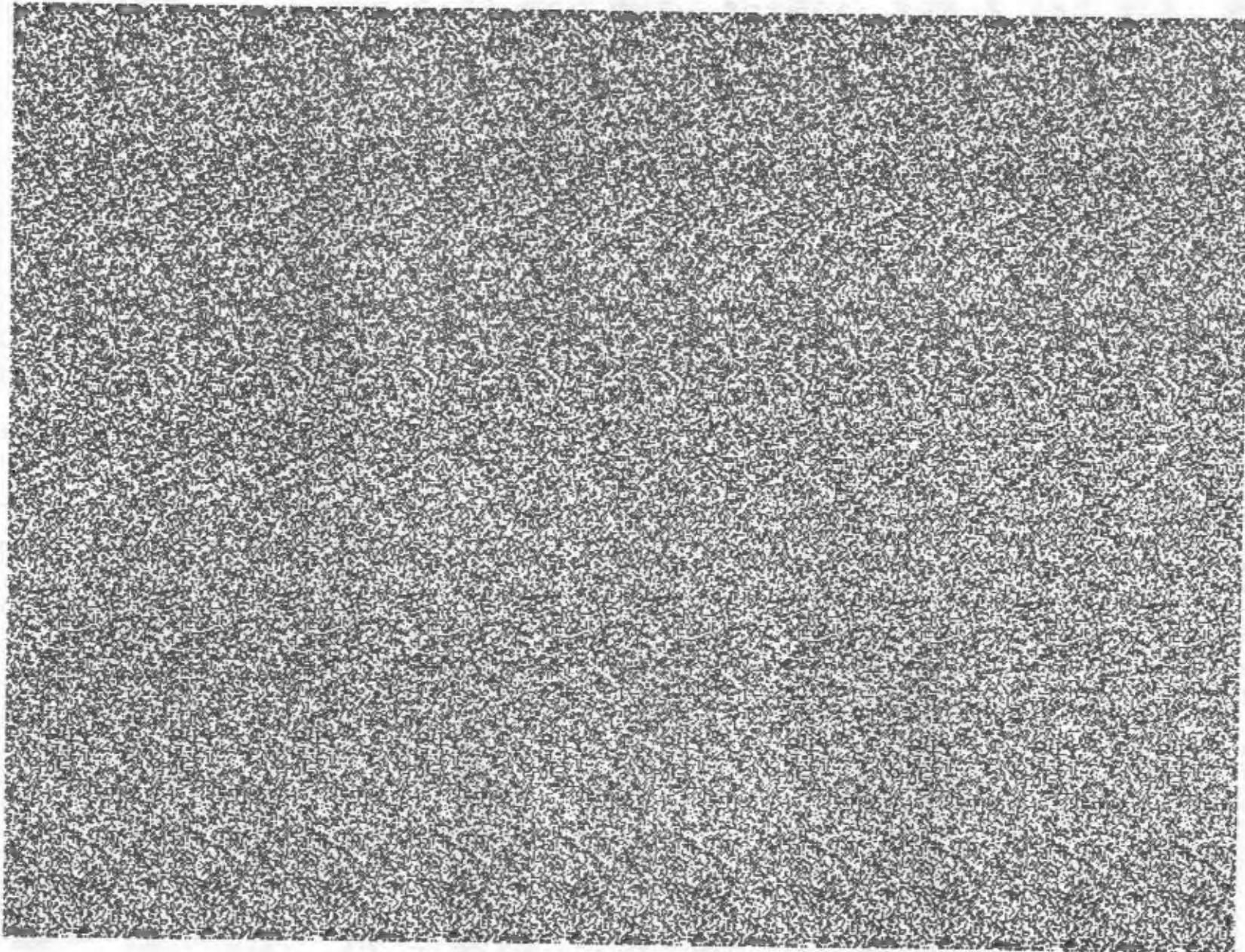
DIGRESSION--It's a bit like watching a photo being developed--quite amazing really. You can actually "watch" as your brain's pattern recognition circuits fill in more and more of the detail. All I can honestly tell you relative to the time and effort involved is that just about everyone who finally 'gets it' or "sees it" feels that it was well worth the effort. But...not everyone gets it. So you MAY have a frustrating experience. The best thing is of course to show the image around to friends. You'll very likely find someone who sees it and they'll be most pleased to help you, as you will be to help others once you've gotten it!

METHOD TWO

The second method is an attempt to help accomplish the first chore: getting the eyes to diverge the correct amount. Hold the practice image absurdly close to your eyes--like actually touching your nose. Hold it there long enough so that your eyes start looking through it rather than at it. Being that close of course means there is no way to look AT it. But wait long enough to become comfortable just spacing out, looking through the image. Slowly (no more than two inches per second) and being careful to hold the image level at all times, draw the page away from your face. With your PERIPHERAL vision observe the dots. They should at some point (about 8 to 16 inches from your face) "fuse" to form a central dot (with two fainter side dots). Stop moving the image. Continue to observe the central dot without trying to look "at" it. (As soon as you look AT it, you'll lose it.) As you practice this (and it MAY take many attempts) you will begin to perceive more and more "depth" in the image. Each time you may try to look "at" the image, it will disappear.

DIGRESSION #2--Experiments performed primarily by Psychologist Bella Julesz at the University of Chicago in the 1960's used double image random dot stereograms to prove that "photographic memory" in fact exists, and acts photographically! Subjects claiming to have "photographic" memory were shown a random dot image in one eye only. It was removed from view and its partner image was shown to the other eye. Those with actual photograph memory were able to "see" the message.

DIGRESSION #3--Chuck Yeager, perhaps America's most famous and noted test (and fighter) pilot reports that the ability to "focus" on infinity is a vital skill for fighter pilots! By "focus" is really meant "aim" in the sense of diverging one's eyes to parallel. In a sky with no sharp objects to focus on, your eyes tend to aim about 24 feet in front of you. This makes it difficult if not impossible to pick out small objects a great distance away (like, say, a bad guy coming to get you!).



GENERAL MEETING

APRIL 13, 1992

The meeting was chaired by VP Luci N0OUD due to the illness of President Harv. All members and guests introduced themselves. Minutes were approved as printed in O-BEAT.

Treasurers report as follows:

Bal fwd \$1263.01
Income \$337.01
Bills \$122.27
Bal \$1577.75

Mike Sheldon reported the Pikes Peak Hill Climb needs volunteers. His number is 574-3804 call in evening or get in touch with Mike KOTER 636-1290. The Hill Climb is Sat July 4th.

Committee reports:

Publicity AL, N2IWZ announcement of swapfest supposed to be on cable TV, some members reported they had seen it.

Education ROSIE, WA0MNL next classes will be 14 Sept. at Rustic Hills for novice and tech. It will be on Monday and Thursday nights contact her or AL, AD0Z for info and registration.

VE TEST CHRIS, NXOE next test during swapfest at East Junior High, then second Saturday in June at Chapman College contact Chris for registration for the June test, pre registration required.

INTERFERENCE BILL, N0NJK had one case.

ARES & PUBLIC SERVICE MIKE, KOTER wishes to thank all who helped on the previous walks. The Falcon Wanderers need help May 23rd, at Garden of Gods for relay to Black Forest Group. Be careful what you say over the air on any search and rescue mission or any event Sky Warn, ect, as media is always monitoring all frequencies.

RACES NO REPORT.

SKYWARN & TRAILER Please sign up Sky Warn Roster form as WX Bureau still has the other sheets, their are going to install voltmeter in line with trailer battery.

CCARC OAK, K9ROL Nothing, have not received any minutes.

O-BEAT RON, NK0P We received a superior recognition award for our news letter from the Amateur Radio News Service. We ranked among the top 20.

SWAPFEST MAT, KC4KGS 8am to 4pm Saturday May 16, vendors at 7am, set up Friday from 4 to 7 pm, need help then and Saturday after swapfest. AL, N0CMW still has a few tables.

OLD BUSINESS:

NONE

NEW BUSINESS:

Nominations for vacated board position:

FRED, KA0WIE

MALLORY, N0IKF

DENNIS, N7OGL

KEN, N0NKP.

The winner was KEN, N0NKP.

Field day will be June 26, 27, 28 at Air Force Academy. MIKE, KOTER in charge.

RAFFLE conducted by Luci, Tom, N0NTX terminal strip, Dennis N0NKN tape, spike protector George M., N0OPG Kenwood cap, Larry, N0AMP Kenwood cap, Rosie, WA0MNL Kenwood cap, Steve, WB7VHR tie wraps, N0PZU kenwood cap n0nkp duster spray, KB0EPN tie wraps, Barry, W0MOG spiral wrap.

Our program was given by WO0J. It was a very enlightening and informative talk on the duties of an Official Observer known as OO. He answered various questions about it. It was very interesting for old and new hams alike.

submitted by AL N0CMW SEC PPRAA

PPRAA ANNUAL PICNIC

Our annual picnic will be held August 16th at the Air Force Academy picnic ground #3.

Hot dogs, hamburgers, and drinks are provided by your club. The cooks will start about 12 noon to ??

We suggest you bring a dish to share...people with last name starting A--M bring vegie, salad, or chips. N--Z bring fruit or desert.

Amatuer radio operators, family, and friends are invited.

Would you like to have a tail-gate swapfest??

The committee consists of:

Rosie, WA0MNL and Russ, KB0FNM 471-9965

AL, N2IWZ 594-9760

FANNY PACK II

by Oak Stockton, K0ROL

Many of us have older handi-talkies whose nicad battery packs have committed suicide or have died of old age. There is hope for a resurrection at low cost and little workshop effort. My vintage Icom IC-2AT, IC-3AT, and IC-4AT each came with a small 7-cell battery pack, IC-BP3, delivering a nominal 8.4 volts at 270 mAh (milliamperc-hours). The 7 cells are spot-welded together in series, and are only factory replaceable. A replacement pack costs about \$32! The sophisticated little charge controller is still usable, even when the cells have had their last gasp! Here is a project that will give at least a 20-fold operational life to your handi-talkies, and make long-winded QSO's and public service gigs more fun.

During minor surgery to remove the dead pack of N0270AA mini-cells, drill a small hole in the upper front of the case to pass a small twisted pair of leads to be soldered to the bottom terminals (+ & -) of the now empty case. Reassemble. Allow 3-4 feet of the twisted pair to reach the FANNY PACK assembly.

The FANNY PACK is designed to hold seven size D nicads snapped into a row of cell holders bolted to an aluminum plate. I used Radio Shack 4-cell, 2-cell and single cell holders mounted side by side. The aluminum plate is about 11 inches long, enough to mount 1-inch wide nylon webbing straps, with ample length to encircle your waist and a buckle to fasten it with. A neat Naugahyde "envelope" was tailor-made by Ora, N0QJX to keep the FANNY PACK waterproof. The original BC-25U wall charger or the BC-35 desk charger takes 15 hours or so.

Oak, K0ROL

WANTED!!!

Your club needs your help:

- 1) Christmas Party chairperson
- 2) Swapfest chairperson for 1993

Past experience has shown that now is the time to start thinking about these functions.

Interested club members contact any club officer or board member.

BOARD MEETING

MAY 19, 1992

Meeting was held at the QTH of RON NK0P. The following members were present.

LUCI N0OUD,
STEVE WB7VHR,
RON NK0P,
AL N2IWZ,
HARV WB6YXD,
RUSS KB0FNM,
AL N0CMW,
ROSIE WA0MNL,
MATT KC4KGS,
KEN N0NKP.

We will have some by-law changes up for vote next meeting night. The profit from the swapfest was \$1317.13. We need a volunteer to chair the Christmas Party now so as to have a nice one this year again and not with last minute hustle and bustle. We need a person to head up the single sideband station at field day and Mike has put out a challenge that the cw station would beat them in points.

Board approved giving ARES \$150.00 plus the profits from food sales at swapfest.

HARV GIVES HIS THANKS TO ALL WHO MADE SWAPFEST A SUCCESS.

The program for June will be put on by THE EDGE OF SPACE.

NX0E, CHRIS SMITH will do the August and September issues of 0BEAT.

Board is investigating and asking for estimate of damages to the personal property of Doug WB0MHP.

Next board meeting at the QTH of AL N0CMW.

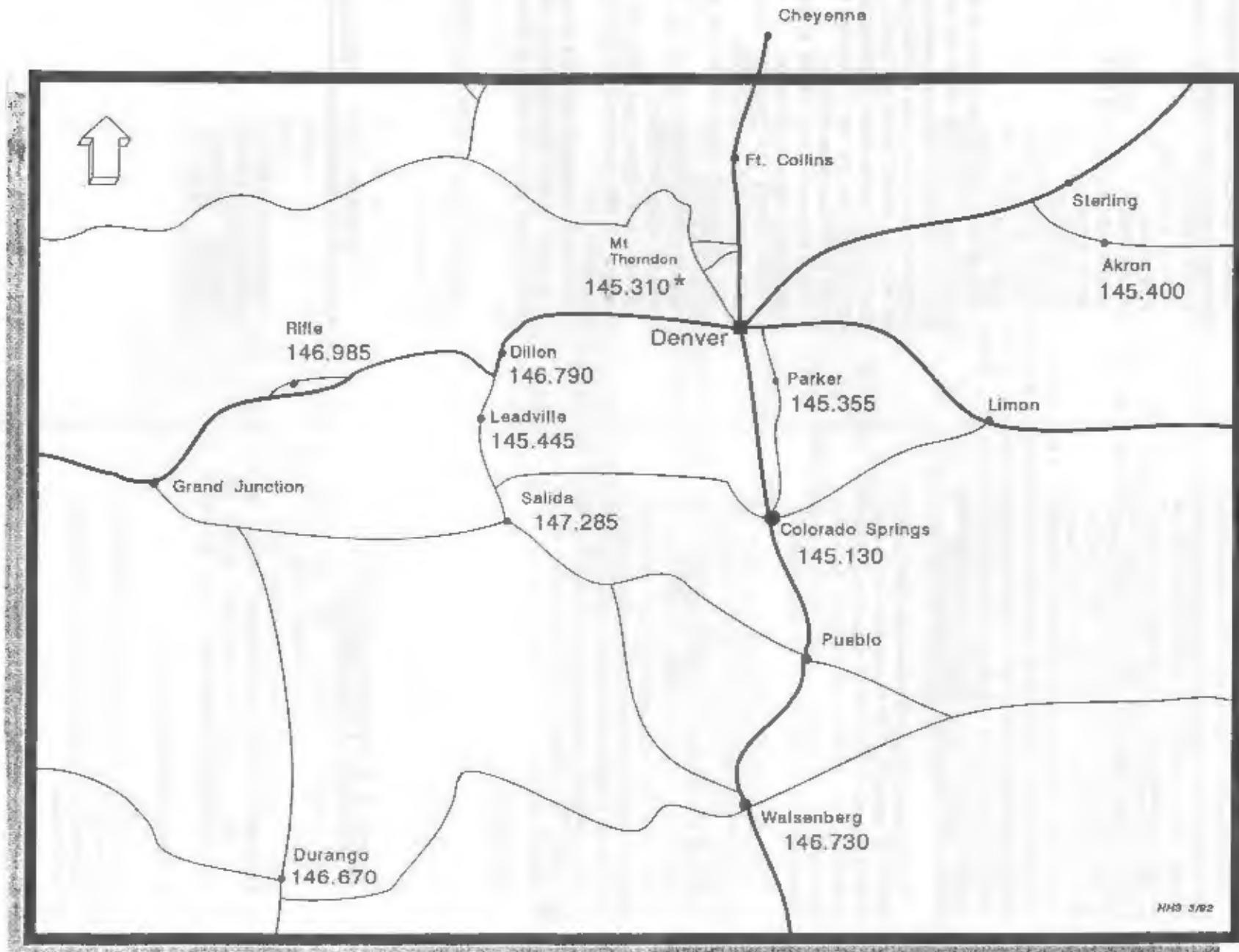
It is not too early for someone to come forward and head up swapfest for next year if we are to have one.

submitted by AL N0CMW SEC PPRAA

SWAPFEST FINALS

Attendance:	810
Income:	\$4,343.16
Expense:	\$3,026.03
PROFIT:	\$1,317.13

COLORADO CONNECTION



OPERATING EVENTS

June, 1992

13 - 15 ARRL June VHF QSO Party. Details in May QST, page 126. This is the premier VHF Contest. A lot of VHF activity, even on Two Meter FM. No operation is allowed on repeater frequencies, or on 146.52, but look for activity on other simplex frequencies such as 146.55. Even an HT and a small beam from some of our mountain peaks can generate some great contacts.

20 - 21 SMIRK QSO Party. Sponsored by the Six Meter International Radio Klub. Great fun with sporadic-E skip on six meters. Details in June QST, page 97.

27-28, Field Day. Join the PPRAA for a lot of fun. This is a great learning experience for all hams. Come on out and join the fun.

July, 1992

11 - 12, International Amateur Radio Union HF World Championship. Details in April QST, page 98.

Hamfests, Special Events, Picnics, etc...

■ Super XIV Hamfest - Larimer Co. Fairgrounds, Loveland, CO — June 13, 1992.

■ Ski Country ARC Swapfest, Colorado Mountain College, Glenwood Springs, CO — July 11, 1992.

■ Denver Radio Club Swapfest and ARRL State Convention, Jefferson Co. Fairgrounds, Golden, CO — July 12, 1992.

■ Mountain ARC Swapfest & Campout, Red Rocks Campground in Pike National Forest 4 miles N. of Woodland Park — July 25-26, 1992. Reservations required for camping; campers may arrive Friday evening. \$7.50 per night per space for camping and/or selling (no double charges).

HIGH FREQUENCY AWARDS

Rick Brown, KD0SU

For those of you who are interested in earning award sponsored by the ARRL, I have received my Awards Manager certification from them, and am now able to verify applications for the ARRL Worked All States Award and the 5-Band WAS.

If you are interested in earning these awards, I have copies of the application form, or you may get them from the ARRL. Please read the rules and make sure your QSL cards contain all the needed information when applying for awards. As I have noted in other articles, altered cards cannot be accepted for credit.

When you have received all the QSL cards needed for an award and have completed the application please contact me for verification of the application. I must personally inspect all of the cards before I can sign the application. You can send the cards to me, or make arrangements to drop them off with me. I will then verify the cards as quickly as possible and get the cards back to you. Due to my schedule, I can not promise on the spot verification, but I will get it done as quickly as possible.

I have found the Worked All States Award to be a lot of fun to work for, and it is achievable by those with very modest stations. Also, there are many specialty awards and endorsements such as SSB, CW, Novice, QRP, Single Band, and others that are quite challenging.

If you are interested in this award and want more information please feel free to contact me at 531-9423 or any time you hear me on the air (Usually 146.52 MHz).

DITS AND BITS

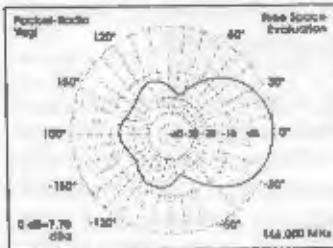
For Sale:

Azden PCS 6000H, 50 watt 2 mtr FM transceiver. Rx 118.000 to 173.995. Includes AM aircraft band, TT mike. \$275.00 AI, N0CMW 473-1660

For Sale:

2Mtr. J pole antenna. Receives and transmits 440 fairly well. \$35.00 Tripod roof mount mast \$3.00. B&W Dipole Balun with lead cable, \$10.00 Ken, N0NKP 574-6358.

Two Meter Yagi Great For Packet Radio or FM



H-Plane beamwidth 60 deg
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